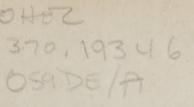
CIRCULAR No. 33. 10,000-June, 1906.





ACCOMMODATIONS AND EQUIPMENT OF RURAL PUBLIC AND SEPARATE SCHOOLS.

INSTRUCTIONS TO INSPECTORS AND SCHOOL BOARDS.

Approved by the Education Department, July, 1906.

By the Act of 1906, respecting the Department of Education, the basis of distribution of the Legislative grants to Rural Public and Separate Schools has been changed. (Sec. 23, sub-secs. 5 and 6.) After the present year, the general and special legislative grants and the county equivalent to the latter will be divided on the basis of the salaries paid the teachers, the character of the accommodations, and the value of the equipment, after providing a minimum grant for each such school which is equipped as required by the Regulations of the Education Department. The scheme for this distribution will be settled by the close of the present year, and will be similar in character to that which has proved so effective in the case of the High Schools. (See Regulation 149.) It will, accordingly, provide for the payment of a percentage of the salary paid the teacher over the minimum prescribed by the recent Public Schools Amendment Act, a percentage of the value of the equipment over the minimum prescribed herein, and graded sums under each heading of the accommodations as detailed herein.

As a guide to Inspectors and Rural School Boards, the instructions in this circular are now issued. In the case of the details prescribed below under "Accommodations," the Inspector is directed to use his judgment in securing them, having due regard to the interests of education, the capabilities of the present premises, and the financial competency of the boards. These details are, however, obligatory in the case of new buildings, and they are the basis on which, using his discretion, he shall found his grading. The Inspector will grade the accommodations in his report to each School Board during the first half of 1907, and will, in that year, distribute, on the new basis, the Legislative and County grants concerned. In order to do this satisfactorily, it would be well for him to make for himself a tentative grading of the accommodations of each of his schools, during the coming half year, on the supposition that there will be three grades under each heading.

As already pointed out in Circular 15, of May, 1906, it will be eminently prudent for every School Board to spend its extra income during the coming half year on the improvement of the school accommodations and the equipment. Before making such improvement, each

Board should consult the Inspector, whom, in the same circular, the Minister directs to modify his ordinary routine for the coming halfyear so as to have time to discuss the changes with at least the Chairman of each School Board and with the County Council and the Township Councils in his inspectorate. For this purpose he should also convene meetings of the ratepayers and the school trustees: It is not probable that a large number of the schools will be able to secure in the first year the highest grading under many of the heads, but an effort should be made by each School Board to effect at an early date as many improvements as its finances will permit. Cases will, no doubt, arise in which School Boards will be unable to complete their improvements during the coming half-year. In such cases, in grading the accommodations and valuing the equipment, it will be at the discretion of the Inspector to recognize improvements made during the first half of 1907, even after his official visit, if duly reported and certified to him by the Principal and the Board of Trustees, on a date to be fixed by the Inspector, before the ensuing distribution of the grant. In this connection, it is important to note that the grant to each township is separate from those to the other townships in the County, and, accordingly, except in the case of certain union sections, the schools of each township will compete for the grant only amongst themselves. It will therefore be prudent for the Inspector to begin with a high standard of grading and to maintain the same standard throughout his inspectorate. To both of these provisions, it is manifest, he cannot attach too great importance.

The details under the head of "Minimum Equipment," given below, are now obligatory and should be provided as soon as practicable. Until it provides this minimum, no school shall share in the Legislative and County grants after the present year. When, however, the Inspector is satisfied that a Board is too poor to comply with the requirements, he may, at his discretion, extend the time till the summer of

1908.

ACCOMMODATIONS.

(1) School Grounds.—As a minimum, the school site shall not be less than one acre in area, accessible by good highways and not exposed to disturbing noises. The school grounds shall be properly levelled and drained and at least 100 yards from stagnant water, and provided with adequate walks of plank, brick, flags, gravel, or cement. For the highest grading the grounds shall also be ample for school games and for an ornamental plot in front. They should also be set out with trees and ornamental shrubs, and enclosed by a neat and substantial fence or hedge, with suitable gates (iron preferred). Unless so enclosed, the school grounds shall not be rated of the highest grade. In order to ensure good drainage and water supply, the soil should, if practicable, be sandy or gravelly, not clayey or peaty. No trees shall be placed so close to the school building as to check the free passage of air and light. About one-third of the play-grounds should be allotted to the girls, the rest to the boys.

- (2) Closets.—The closets for the sexes shall be under separate roofs and placed at least 50 feet from the well and the school building, to prevent pollution of the well or the air of the class-rooms. Each closet shall contain a sufficient number of compartments properly lighted and ventilated, and, for the highest grading, each compartment shall be provided with a door. The boys' closet shall be built of glazed brick or similar material, or of wood, painted a dark color and sanded, with a floor of tiles or glazed bricks. Urinals of slate or else lined with zinc or galvanized iron, shall be provided for the boys. For the highest grading in schools with more than one teacher, there shall be locked compartments for the teachers. Suitable covered walks (cement, flag, or brick preferred) shall be laid from the doors of the school building to the closets, so that the closets shall be accessible with comfort at all seasons of the year, and provision shall be made for keeping the walks free from snow in the winter. A close board fence or a wall, about six feet high, shall be provided between the boys' and the girls' side, from the closet to the school building; and the closets shall be placed at least ten feet distant on each side. The entrance to the closets shall be properly screened (spruce trees in front of each closet) and the doors shall be locked after school hours by the teacher, and opened before school hours by the caretaker. The closets and urinals shall be cleansed and disinfected monthly if possible. Dry earth closets or closets with draw-boxes are to be preferred.
- (3) Water Supply.—The water supply shall be adequate. There should be a well, (artesian if at all practicable) with a neat pump and platform, of good drinking water, on the school premises, properly protected against pollution from surface drainage or any other source. If a dug well, it shall be thoroughly pumped and cleaned out at the close of each vacation and at such other times as may be deemed advisable by the teacher or by the inspector. Graniteware pails, or, for the highest grading, earthenware or graniteware water-tanks with covers, and drinking cups of glass or good enamelled ware shall be provided and kept scrupulously clean. Where there is no well, other provision, satisfactory to the inspector, shall be made for an adequate supply of good water.
- (4) School Building.—The grading of the school building shall depend upon the character of its site and its construction. The building should have a southern exposure and shall be at least thirty feet distant from the public highway. Its architectural appearance shall be considered, and, for the highest grading, more than merely a plain building shall be required. The entrance shall have a vestibule or covered porch. In schools with more than one teacher, for the highest grading, there shall be separate entrances, and separate means of egress to the closets at the rear. Where there are two stories, the second floor shall be sound-proofed with mortar, felt, or other suitable material. A school bell (and, in the larger schools, a fire alarm gong) shall be provided, and a flag and flag-pole. Every school should have a basement, at least seven feet high in the clear, ceiled with wood or plaster, and having a pine, hardwood, or (preferably) cement floor. Cordwood shall be well dried before being stored in the basement. Where there is no basement,

an adequate woodshed shall be provided, at least 20 feet from the building, of wood, brick, or other suitable material, with proper doors and locks. The wood-work of the shed shall be painted a suitable color.

(5) Class Rooms.—The class rooms shall be oblong (length 7 feet more than breadth), and large enough to seat comfortably all the pupils. A superficial floor area of at least 12 (16 preferred) square feet, and a cubic air space of not less than 250 feet shall be allowed for each pupil, the provision being based on the highest attendance. Hardwood should be preferred for all the woodwork, especially for the floors. Except for the floors any material of such quality and grain as would suit for an oil or varnish finish will suit. Suitable color schemes (the ceilings being always white, or slightly tinted) should be adopted for the halls and class rooms, which should be painted rather than calcimined. Wood finish, instead of plaster, may also receive the highest grading. If calcimined, the walls must be kept free from dust, and recalcimined when needed. If painted they must be washed down and repainted also when needed.*

Adjustable transoms shall be placed over the class room doors which shall swing outwards either way. At least one waste paper basket shall be provided and the floors shall be kept in good order. A closet or a cabinet shall be provided for utensils used in school work; also a map case and shelving for lunch baskets or lunch pails. As soon as practicable, the class rooms should be decorated with good pictures, casts, vases, and other ornaments. Suitable scrapers and mats shall be placed at the outside doors. In localities where flies are troublesome wire screens should be provided for the doors and windows.

(6) Teachers' Private Rooms.—There should be a room for the private use of the teacher or the staff, of suitable size and comfortably furnished.

- (7) Halls.—The entrances, vestibules and halls shall be roomy and well lighted, and shall be so placed as to admit of separate entrances for the sexes to the cap and class rooms. The entrance and vestibule doors shall swing outwards or either way. For the highest grading, in buildings of two stories, there shall be separate stairways for the sexes, easy of access and well guarded. Here, also, suitable color schemes and decorations should be provided.
- (8) Cap Rooms.—For the highest grading, and in all schools to be erected hereafter, separate cap-rooms shall be provided for the sexes. The cap-rooms shall be conveniently situated with respect to the class rooms and shall be provided with wash basins and towels and with all the necessary appliances for storing umbrellas and for hanging caps or cloaks. Where there are no cap-rooms, there shall be an adequate supply in the class room, of hooks, for caps, cloaks, etc. Curtains should be strung on wires to conceal the clothing.
- (9) Desks.—Every school house shall be seated with either double or single desks with movable seats and noiseless joints, such single desks being necessary for the highest grading. The desks shall be fastened to the floor in rows facing the teacher's platform, with suitable aisles between the rows and with passages at least three feet wide

^{*}Inspectors and School Boards should consult "School Sanitation and Decoration," by Burrage and Bailey; \$1.50; D. C. Heath & Co., New York City.

between the outside rows and the walls of the school room. The desks and seats shall be graded in size to suit the age of the pupils, those of the same size being placed in the same row from front to rear. The pupil, when seated, must be able to place his feet fully and easily on the floor. The number of the desks shall be adequate for the number on the roll.

There shall be a suitable desk and chair in each class room for the use of the teacher, and at least two chairs for visitors. The teacher's desk shall be provided with two drawers or compartments, with lock and key. There shall be a table of suitable size, around which the younger pupils may assemble to do part of their work. Where Chemistry or Physics is taken up in a higher class, a suitable table should be provided for the experiments; and, in such schools, this provision shall be necessary for the highest grading. A sloping stand for the large

dictionary shall also be provided.

(10) Blackboards.—There shall be one blackboard of good quality, at least four feet wide, extending across the room in the rear of the teacher's desk, with its lower edge not more than two and one-half feet above the floor; and there shall be additional blackboard provision on each of the other sides of the room. Slate is greatly to be preferred and is cheaper in the end; hyloplate will do. There shall also be an adequate supply of blackboard brushes and crayons, the former to hang below the trough. Where there is a platform it shall be from four to five inches high and should extend across the room where practicable. At the lower edge of each blackboard there shall be a trough, covered with wire netting, five inches wide, for holding crayons and brushes. The troughs and brushes shall be cleaned every day.*

(11) Lighting .- For the highest grading, the class rooms shall be lighted from the left of the pupils, the lower edges of the windows being on a level with the tops of their heads. Where there are windows in front of the pupils, it is indispensable that they shall be closed up. To admit of an adequate diffusion of light throughout the whole class room, the windows shall be numerous (area, one-fifth or one-sixth of the floor space, where the lighting is good; otherwise a greater area), and of clear (not ground or painted) glass; narrow, with two or four panes each; and running as close to the ceiling and as far to the rear of the

*The following directions for making a blackboard may be found useful (Such blackboards, however, are never satisfactory):

laths for holding the plaster nailed firmly on the boards.

(b) The plaster for the blackboard should be composed largely of plaster of Paris.

(c) Before and after having received the first coat of color it should be thoroughly polished with fine sand paper.

⁽a) Where a brick wall is built solid, and also in case of frame buildings, the part to be used for a blackboard should be lined with boards, and the

⁽d) The coloring matter should be laid on with a wide, flat varnish brush. (e) The liquid coloring should be made as follows: - Dissolve gum shellac in alcohol, four ounces to the quart; the alcohol should be ninety-five per cent. strong; the dissolving process will require at least twelve hours. Fine emery flour with enough chrome green or lampblack to give color, should then be added until the mixture has the consistency of thin paint. It may then be applied in long, even strokes, up and down, the liquid being kept constantly stirred.

class rooms as practicable. They shall begin about five or six feet from the front of the class room. The windows shall also be provided with blinds of suitable color and size. The blinds on the left of the pupils should be semi-transparent; other blinds should be opaque. On dull days, windows in the rear and on the right may be serviceable; but, if the light from the left is adequate, they should not be used at other times.

- (12) Heating.—The temperature of the class rooms, halls, caprooms, and teachers' private rooms shall be, as nearly as practicable, 68 degrees. A thermometer shall be provided for each class room. For first-class grading, steam radiators or hot air furnaces are necessary. Where stoves are used, they shall be so placed as to prevent discomfort to any pupil; shall be protected by a jacket of tin, zinc, or galvanized iron; and shall be provided with a strong iron poker, shovel, and pail for ashes. The stove-pipes and the chimneys shall be kept free from soot and dust. Both stoves and stove-pipes shall be polished at least three times a year.
- (13) Ventilation.—Provision shall be made for an adequate supply of pure air at all times. The foul air shall be removed and the pure air supplied so that there shall be a complete change at least three times an hour. The windows of every school building shall be adjusted by weights and pulleys, and, when the outside temperature permits it, they will provide the necessary change of air. In cold weather the windows may be raised at recess from below and lowered from above, according to the outside temperature; but the necessary constant ventilation cannot be secured by this method. The pure air shall be admitted directly from the outside through sufficient ducts running under the floor and opening below the stove. The pure air supply shall be under control by slides to open or close the ducts. Where steam heating or a hot air furnace is used, the pure air shall be admitted directly from the outside, at a height of about four feet from the ground, to the base of the furnace. In the air space of each furnace or within the jacket of each stove there shall be a pan filled daily with water, so as to furnish the warmed air with the necessary moisture. (Air shall not be taken from the school room or from the basement to supply the furnace, except in the morning before school, after which, this source of supply must be shut off.)

In all cases the foul air shall be taken away from near the floor and out through ventilating ducts in the chimney, which ducts should be somewhat larger in area than the incurrent pure air ducts. In buildings where ventilating ducts have not been provided in the chimneys, two tin, zinc, or galvanized iron pipes (about six inches by ten inches) should extend on opposite sides from near the floor, connecting below with the class room and running up through the ceiling beside the chimney, and so placed as to be well heated. Openings, with regulating slides, should also be provided in these ducts near the ceiling for use only when the room is overheated. When needed, a cowl should be placed so as to cover properly the chimney and the excurrent foul air ducts.

Where storm sashes are used on the outside, they shall contain sliding panels in the wood or the panes or shall be hinged at the top, to allow of the ingress of pure air; or they may be placed on the inside and also hinged at the top. It answers equally well to have double panes of glass about one-half inch apart in the same sash.

Reg. 9 (Amended).—The trustees shall appoint one of themselves or some other suitable person to keep the school house and premises and all fences, water-closets, outhouses, walks, windows, desks, maps, blackboards, and stoves in proper condition. It shall be the duty of the teacher to inspect the premises daily and report to such officer without delay any needed repairs. The trustees shall also provide for washing the floors at least quarterly (monthly to be greatly preferred), and for whitewashing, every year during the summer holidays, the walls and ceilings if finished in plaster, or for washing them if finished in wood or steel sheeting and painted; and shall employ a caretaker whose duty it shall be to sweep the floors daily (the windows being then open), to dust daily all the furniture, window ledges, etc., with damp dusters (preferably in the morning at least an hour before school); to make fires, at least one hour before the opening of school, from the first of November until the first day of May in each year, and at such other times in October and May as the teacher may direct. The duties of the caretaker shall be arranged for and performed satisfactorily to the Inspector.

Reg. 10.—No public school house or school grounds, unless otherwise provided for in the conveyance to the trustees, shall be used for any other than school purposes without the consent of the trustees, and no advertisements shall be posted in any school room or distributed

to the pupils unless approved in the same way.

Reg. 10 (a).—Hereafter, subject to appeal to the Minister of Education, all new school sites and all additions to old ones and all plans of new schools or of additions to old ones, and all other proposed school accommodations, shall be approved by the Inspector of Public or Separate Schools (as the case may be), who shall be guided by the instructions contained herein. (New Regulation.)

MINIMUM EQUIPMENT.

Reg. 8 (Amended).—A globe, not less than nine inches in diameter and properly mounted; a map of the hemispheres; a map of each continent; a map of Canada; a map of Ontario; a map of the county (if a suitable one is published); a map of the British Empire; a map of the British Isles; an atlas or a gazetteer; a standard dictionary for each class room (with English pronunciation); a numeral frame (or an adequate supply of loose cubes); a good clock for each class room, kept in good condition; a set of mensuration surface forms and geometrical solids; a blackboard set for each class room (one protractor, 151 inches, triangle, 24 inches, a pair of compasses, two pointers, a graduated straight edge); a pair of scales, with weights, to weigh from half-ounce to ten pounds; a set for measure of capacity (pint, quart, gallon); a set for linear measure (inch, foot, yard, tape line); a set for square and cubic measures; a school library of the minimum value of \$20.00 for each teacher employed, increased annually after December, 1907, by at least \$10.00 until the value for each teacher employed reaches \$100.00. A suitable book case shall also be provided.

For a list of books, see Catalogue of Books for Public School Libraries, issued by the Education Department in 1902. In making the selection, the inspector's approval should invariably be secured. He is directed to strike off the list any unsuitable purchases. Regs. 117, 118, 121, and 122 are hereby cancelled.

ADDITIONAL EQUIPMENT.

Besides the above equipment, which is obligatory in every rural public and separate school, the Education Department has issued three other circulars: No. 6a. (a list of scientific apparatus suitable for Fifth Form and elementary Continuation Classes); No. 6. (a list of scientific apparatus suitable for advanced Continuation Classes), and No. 6b. (a list of equipment for Domestic Science, Construction Work, and School Gardens, in rural schools,). From these lists Boards should select, with the approval of the Inspector, such apparatus as may be needed for the work done in the several departments. These lists have been distributed along with this circular, but additional ones may be obtained upon application to the Inspector.

A book in which to record from time to time the value of the equipment will be provided by the Education Department for each rural

School before next August.